

REACH

A publication of the U.S. Department of Energy for all Hanford Site employees



TESTING SNF DRYING EQUIPMENT: In Bay No. 5 of Fluor Hanford's Cold Vacuum Drying facility, field engineer Leslie Fernandez, left, and test engineer Kurt McCracken of the Spent Nuclear Fuel Project check connection hoses in a successful integrated test of the Multi-Canister Overpack drying process. (See story, page 6.)



Congress approves added FFTF funding

Congress appropriated an extra \$9 million on April 20 to safely maintain Hanford's Fast Flux Test Facility and complete an environmental impact study.

The FFTF began this fiscal year with a budget of \$36.3 million, but \$5.6 million more was needed to maintain the facility in a safe condition. The other \$3.4 million will be used to study the environmental impacts of restarting the dormant reactor.

The Department of Energy will consider operating the FFTF to make medical isotopes, conduct research and possibly produce plutonium-238 for the space program. The alternative would be permanently shutting it down. Secretary of Energy Bill Richardson has promised a decision on a possible restart by the end of the year.

Earlier this year, some employees were transferred to other projects to keep spending within the FFTF's limited budget. ♦

Battelle to give up to \$250,000 to Kennewick schools

Battelle will give the Kennewick School District as much as \$250,000 over the next five years to establish a science resource center that includes hands-on science education materials for students and professional development opportunities for teachers. Battelle operates the Department of Energy's Pacific Northwest National Laboratory for the Department of Energy.

Battelle's director of K-12 science education programs, Jeff Estes, presented the school district with a \$50,000 check at a ceremony at Kennewick's Canyon View Elementary school on April 24. The gift is the largest ever by Battelle to a local school district. Future support is contingent on regular performance reviews.

"Local school districts are working hard to improve their science education programs so students can meet the tough academic learning requirements mandated by the State of Washington," said Estes. "We view the resource center as a ground-breaking endeavor that is key to developing a strong kindergarten-through-eighth-grade science education program — not only in Kennewick, but in the entire Tri-Cities as well."

"The establishment of the Battelle Science Resource Center is the key for the Kennewick School District to obtain the goals of our five-year, grade K-8, Leadership and Assistance for Science Education Reform science program," said Kennewick Superintendent Paul Rosier. "One of the most important aspects of the center is combining the materials and staff training for the program in one location."

The Battelle Science Resource Center will be located on South Fruitland Street in Kennewick. The Kennewick School District will invest approximately \$100,000 during the 2000-2001 school year for the center and will increase the amount to nearly \$200,000 later in the five-year program.

The materials are contained in "science kits" and include items such as live organisms, mineral samples, hand lenses, balances, batteries and bulbs. Part of the Battelle funds will be used to purchase, distribute and refurbish the kits, which cost an average of \$500 each. Battelle funding also will cover the training necessary to use the kits effectively.

"The kits include all of the classroom materials and equipment an elementary or middle school teacher needs to conduct lessons that parallel the way scientists and engineers uncover knowledge and solve problems," said Jim McLean,

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The *Hanford Reach* is published weekly
for all employees of the U.S. Department
of Energy's Hanford Site.

**Deadline is 10 a.m. Thursday, 10 days
prior to Monday publication. All
articles are subject to editing. Contact
the editors by phone, fax, site mail or
e-mail.**



Printed on
recycled
and
recyclable
paper.

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science curriculum specialist for Kennewick schools. There are three types of kits for every grade level — physical, earth and space, and life sciences.

Estes added that he's hopeful the Kennewick center eventually will serve as a regional facility and that the district will make the kits available to teachers and students in neighboring school districts.

Battelle is expected to give more than \$500,000 to Mid-Columbia organizations this year, and company policy calls for at least half of the total to go to education organizations and activities. ♦

Annual aerial spraying on Hanford Site to begin soon

Any day now, the annual aerial application of herbicides will commence at various areas around the Hanford Site.

Approximately 200 acres of unpopulated desert on the Hanford Site at McGee Ranch, the 100 B and C Areas and Energy Northwest will be sprayed to control diffuse spotted knapweed. The chemicals to be used at these locations are either Tordon 22-K or a chemical called Teamsline, and Sta-Put Deposition Aid.

About 75 acres of recreational boat launch and parking area west of the Vernita Bridge and between the north shore of the Columbia River and Highway 243 will be sprayed. The target species is diffuse knapweed. Tordon 22-K or Transline will be applied with Sta-Put Deposition Aid.

Approximately 150 acres of the 218-E-12B Burial Ground in the northeast corner of the 200 East Area will be sprayed to control deep-rooted weeds such as Russian thistle (tumbleweed).

Chemicals to be applied in this area are Escort plus Veteran 720 or Weedmaster with Sta-Put Deposition Aid for the initial application — and, for subsequent applications if they're necessary, Veteran 720 or Weedmaster with Herbimax Crop Oil (or similar surfactant), and Sta-Put Deposition Aid.

The same chemicals will be applied to control deep-rooted weeds on about 1,050 acres at the water export line, the 200 Area cross-site transfer lines (old and new), and burial grounds, ponds, cribs and ditches in the 200 and 600 Areas. Another 1,575 acres at the LIGO site, on primary and secondary road shoulders and rail lines, will be sprayed with those same chemicals to control tumbleweeds.

For more information, contact Juan Rodriguez, manager of Waste Management Technical Services Integrated Pest Management Services, at 376-5128. ♦

Law enforcement officers go the extra mile to help

When our security or law enforcement officers go above and beyond the call of duty, the story often goes untold. But we are quick to criticize when they make the inevitable mistakes associated with being human. The following incident is an example of officers doing whatever it takes to help a person in need.

On April 14, an elderly gentleman driving a car from Gresham, Ore. to Burns, Ore. became lost and somehow wound up on the Hanford Site. This 85-year-old gentleman drove by the Wye Barricade without stopping, and was intercepted by officers from Hanford Patrol and the Benton County Sheriff's Office. The officers found the driver to be a disoriented person who had left Gresham four days earlier to drive to Burns.

The man could not account for how he had spent the last four days, nor could he provide any pertinent information about family members who might be contacted to assist him. He had very little short-term memory, was not capable of safely driving his car, had only a few dollars with him and, in general, was not in a position to take care of himself in unfamiliar surroundings.

Hanford Patrol and Benton County Sheriff's officers spent the day ensuring this individual was properly cared for. Lt. Charles Kissler of the Benton County Sheriff's Office stayed with the gentleman, who was more than willing to provide Kissler with tales from his many years of life. He could remember the past very well, but not what happened five minutes before.

After contacting several agencies to find out what help might be available to the man, Kissler finally determined that the best course of action was to get him returned to his home. Hanford Patrolman Loren Buck called Kissler to check on the gentleman and offered to purchase a bus ticket for the man if needed. Kissler had already made plans to drive the man to Oregon himself, on his own time, if necessary.

Kissler was able to arrange for a bus ticket, purchased through the local Crisis Response organization. He then made arrangements with the bus driver to take special care of the man, and Kissler contacted members of the Portland, Ore., Police Department to meet the bus and transport the man home. In the end, the elderly gentleman was returned safely home and is in the care of friends.

As it turned out, the man had no immediate family, except for a sister who was even older than he was. Kissler eventually got in touch with a 72-year-old friend of the wayward traveler, who came to the Tri-Cities to retrieve the car that had been left behind in safe storage.

When asked why he went to such lengths to help this person instead of turning his case over to the Union Gospel Mission in Pasco, Kissler said that he just asked himself the question, "What if that was my grandfather out there? How would I like to believe people would treat him?"



Jim Spracklen,
Director,
Office of Security and
Emergency Services
Department of Energy,
Richland Operations Office

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Kissler explained that, in a world of specialists, law enforcement officers are one of the last generalists. He believes that a lot of human situations fall in the cracks between special occupations and professions, and if law enforcement officers don't catch these cases, there may not be anyone else to help these people. Kissler believes that, "If we don't take care of people in need and get them into the right hands, who will?"

Several other Hanford Patrol officers and the Benton County deputies were involved in helping this person, and they deserve recognition for caring for those who are not in a position to care for themselves. This is a side of law enforcement that the public doesn't see or recognize. Everyday officers across this country are doing whatever it takes to help. The vast majority of officers do what they do because they want to help us and keep us safe, even when we can't keep ourselves safe. ♦

Hanford Transuranic Waste Project passes certification follow-up

The first cargo of transuranic waste is expected to leave the Hanford Site in May.

The Hanford TRU Project had a follow-up visit during the week of April 17 by the Department of Energy Carlsbad Area Office and representatives of the Environmental Protection Agency and the New Mexico Environment Department, or NMED.

This follow-up visit was to verify that corrective actions from a January certification audit had been completed and implemented by the Hanford Project. The follow-up process is to ensure that the wastes stored at Hanford are properly characterized and certified for disposal at the Waste Isolation Pilot Plant repository east of Carlsbad, N.M.

At the end of the follow-up visit, the corrective actions were verified as having been completed. It was anticipated that the Carlsbad Area Office would send a final audit report to the NMED by the end of April recommending certification of the Hanford TRU Project.

The NMED must approve the final audit report prior to Hanford's first shipment of transuranic waste. Ines Triay, manager of the Carlsbad Area Office, told the House Nuclear Cleanup Caucus that she expects the shipment to leave Hanford in May. ♦

Dont forget to send your ideas for Security Ed to: Security Education MSIN L4-09, or e-mail them to ^Security Education PHMC. If your idea is used, you will receive a credit line in the *Hanford Reach* and will become eligible for prizes in the "Security Pays in Many Ways" campaign.

Testing successful at Cold Vacuum Drying facility

Michele Gerber, FH

The first bay of the Spent Nuclear Fuel Project's Cold Vacuum Drying facility was turned over from construction forces to operations last week after a successful conclusion of equipment systems testing.

Complete integrated tests were conducted in Bay No. 5 using a Multi-Canister Overpack loaded with simulated spent fuel and scrap pieces. The MCO was loaded with approximately 600 liters of water and was placed inside a spent nuclear fuel shipping cask on a transport vehicle.

The tests, performed in the same manner as real fuel drying, demonstrated that the CVD process works within the time limits and operating and safety parameters forecast in earlier calculations and prototype trials.

Each one of the two operating bays of the CVD is expected to process two MCOs per week during peak operation. Each Multi-Canister Overpack will spend about 72 hours inside the CVD facility as the MCO moves through a complete cycle of receipt, bulk water drain, cold vacuum drying, pressure testing, final survey and release.

According to Tarik Choho, manager of the CVD Project for Fluor Hanford, the integrated tests showed that the equipment meets performance requirements. "This is especially important, since the CVD process is the first of its kind," Choho said. "It's not routinely used anywhere else in the world, and we had to be sure that it would work."

Teamwork important

Choho and the CVD facility's lead test engineer Ray Maxwell praised the entire team of engineering, construction, start-up and operations personnel who participated in the integrated test. "This was a triumph of synergy among well-coordinated, self-motivated team members," Maxwell said. "We all worked a lot of weekends and long days, and it really paid off."

Construction and test personnel have been on double shifts for nearly three months, as CVD testing has been on the SNF Project's "critical path." The facility must be ready to receive and dry actual spent fuel by the end of November.

Unique process

The integrated test simulated normal operations. The test began when an MCO and cask were moved into Bay No. 5 on one of five transport trailers that were specially designed and built for the SNF Project. The process hood in Bay No. 5 was swung out and over the MCO and cask. Then process connections were made through hoses from the hood to ports located in shielding plugs at the top of the MCO.

An especially efficient and cost-effective feature of the CVD facility is the fact that fuel drying will occur inside the MCO and cask without them ever having to be moved from the transport vehicle. This procedure provides shielding for operators and avoids any need for transfer of nuclear materials.

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During the recent successful integrated testing, Spent Nuclear Fuel Project workers check equipment in Bay No. 5 of the Cold Vacuum Drying facility.

Testing successful at Cold Vacuum Drying facility, cont.

After most of the water was pumped out (all but about 32 liters), test personnel began a vacuum-and-purge cycle to safely dry out the contents of the 14-foot-long stainless steel vessel. Essentially, the CVD process boils away and condenses the approximately 32 liters of residual water by alternating vacuum drying with the injection of helium gas to control hydrogen concentration within the MCO.

The drying and helium purge cycles took 16 to 20 hours, and were followed by a series of short and long pressure rebound tests. If the pressure had risen above a specified level, more drying would have been conducted. "All of the parameters we needed to observe were verified," said Choho. "Line pressures, drying times, pressure curves and other aspects behaved as we expected during the testing."

When actual operations begin in November or sooner, contaminated water removed from MCOs processed in the CVD facility will be pumped into a process water conditioning room on the north side of the facility and transported back to the K Basins. Another streamlined feature of the CVD operation is the fact that no additional "waste water" will have to be treated or disposed of at other Hanford facilities.

Nearly ready

The integrated testing followed a series of construction acceptance tests and individual subsystem tests that occurred in the facility last fall and winter. Construction of the 12,000-square-foot Category II nuclear facility, DOE's newest nuclear process facility nationwide, was finished at the end of October.

The testing of process equipment in the second operating bay, Bay No. 4, has begun. After those equipment trials are completed, facility heating, ventilation and air-conditioning and standby power systems will be tested.

Bay No. 3 will be equipped with spare equipment, while Bay No. 2 will serve as a storage area. Choho expects to turn the entire CVD facility over to Spent Nuclear Fuel Operations later this spring, before a management self-assessment to prepare for fuel drying begins June 12. ♦



CONGRESSMAN VIEWS CLEANUP

PROGRESS: Bechtel Hanford President Mike Hughes, left, briefs Washington Congressman Norm Dicks on progress made by the Environmental Restoration Contractor team in restoring the Columbia River corridor. During his visit to Hanford April 18, Dicks viewed soil remediation work in the 100 Area near D and DR Reactors, the completed interim safe storage project at C Reactor, and the Environmental Restoration Disposal Facility.

Route 4 South to reopen earlier than planned

This Wednesday, May 3, will be the first full day of the resumption of traffic on Route 4 South.

The transition to normal traffic on Hanford's main route will actually begin the evening of Tuesday, May 2. The permanent guard post at the Wye Barricade will be reopened, and the temporary access ramp and guard post now in use for the detour onto Route 2 South will be closed. Traffic flow and security checks will return to normal.

The upgraded intersection at Route 4 South and Canton Ave. in 200 East will remain closed and barricaded for the time being. Look for this alternate access into 200 East to be opened in the near future.

Though the reopening may reduce peak traffic on Route 240, continue to use caution because the Washington State Department of Transportation will be chip sealing on this route. Chip sealing will start today at the Yakima Barricade and proceed north to the Columbia river. Tomorrow (Tuesday), the crew will begin again at the Yakima Barricade and work toward Richland, expecting to reach the Rattlesnake Barricade by tomorrow evening.

Members of the Hanford Site Traffic Council expressed their appreciation for the patience and safety awareness of the affected commuters during the closure of Route 4 South. "Thanks to the notable spirit of cooperation and good weather, the closure went quite smoothly," said Bob Parazin, project engineer with Numatec Hanford. ♦



SHOWING THEIR CIVIC PRIDE: Employees of DynCorp Tri-Cities Water Utilities are participating in the Washington State Department of Transportation's "Adopt-A-Highway" program by volunteering to clean up a two-mile stretch of Highway 240. Their first cleanup outing, kicking off a two-year commitment, yielded more than 50 bags of roadside trash. Now, 12 to 15 bags are filled with refuse every 60 days.

Left to right are Woody Woodford, Jeff Thornock, Ted Perry, Jim Day, Roy Hammond and team leader Burke Neuman. Tony McPherson was behind the camera.

Hanford named top recycler by Department of Ecology

Hanford's infrastructure recycling programs, which are administered by DynCorp Tri-Cities Services for Fluor Hanford and the Department of Energy, earned recognition for Hanford from the Washington State Department of Ecology. The state agency named Hanford "the best federal facility for waste prevention, reduction, and recycling for 1999-2000."

The award, which will be formally presented tomorrow at the Washington State Recycling Association Conference at the DoubleTree Hotel in Pasco, recognizes the site's "innovative pollution prevention practices, waste reduction and recycling programs."

According to Bob Frix, president and general manager of DynCorp Tri-Cities, the award was all the more satisfying considering that nearly all the competitors in the category are military bases, which are required by law to recycle.

"At Hanford, we're not required to recycle," Frix said, "although the DOE strongly stresses conservation and does have a stated complex-wide goal of recycling 33 percent of all material that would otherwise be solid waste. Incidentally, Hanford's recycling efforts nearly double the DOE goal and we are very proud of that."

Anna Beard, coordinator of Pollution Prevention and Waste Minimization for the DOE Richland Operations Office, gave credit to DynCorp Tri-Cities for its efforts. "DynCorp has done an excellent job of taking Secretary of Energy Richardson's call for increased energy efficiency and really running with it," she said. "They've excelled in all areas. DynCorp employees Kathy Hinkelman, administrator of the recycling programs in Investment Recovery, and Candice Marple, who runs the Centralized Consolidation/Recycling Center, have really done an outstanding job."

The Hanford recycling achievement can be attributed to the various waste reduction and minimization programs enacted by Fluor Hanford and DynCorp Tri-Cities Services that address the waste management hierarchy established in the Federal Pollution Prevention Act of 1990. The programs are Source Reduction, Environmentally Safe Recycling, Waste Treatment, and Environmentally Safe Disposal.

Curtis Durrant, a waste reduction and recycling specialist for Ecology's Eastern Regional Office, said Hanford's sheer volume of waste, coupled with the innovative programs developed by DynCorp Tri-Cities Services, were factors that contributed to the award.

"We were really impressed with the employee involvement and the evolutionary processes employed at Hanford," said Durrant. "They have a proactive, on-going approach to recycling and waste reduction, and it shows in the results they achieve."

[See page 10 for more information](#)

Recycling now part of Hanford culture

Fluor Hanford and DynCorp Tri-Cities Services have made waste minimization an ingrained “culture” with Hanford workers. Reminders and tips can be found throughout every facility.

In addition to the education campaign, Fluor Hanford and DynCorp Tri-Cities have also constructed facilities and implemented programs aimed exclusively at cutting waste. Four important ones are:

- ***The Hanford Recycle Programs Office***

This office was established in 1991. Paper recycling had started on a limited basis in 1988, and site-wide expansion began in '91. By 1995, the program included more than 500 buildings on site. Recycling was quickly expanded to include corrugated cardboard in 1992 and software in 1994. Today Hanford is still the only DOE site where software is recycled.

- ***The Centralized Consolidation/Recycling Center***

The Department of Energy and its contractors teamed with the Washington State Department of Ecology to develop a proposal for a Centralized Consolidation/Recycling Center (CCRC) for hazardous wastes at Hanford. In May 1995, the CCRC began operating in the 400 Area. Initially it received batteries, aerosol cans and dioctyl phthalate (DOP) light ballasts. The CCRC now receives 19 recyclable materials that were previously disposed of as wastes.

- ***Investment Recovery Operations***

In the 1970s and '80s, scrap metal was sold to the highest bidder. A formal contract for recyclable metals was established in 1988, and today the DynCorp Tri-cities-managed Investment Recovery Operations organization administers the Scrap Metal Recycling Program. By weight, it's the largest site recycling effort, accounting for more than a fourth of the materials recycled through Hanford's infrastructure operations.

- ***Site Services recycling programs***

Many of the infrastructure site services organizations are leaders in pollution prevention. As the infrastructure services provider, DynCorp Tri-Cities maintains the Hanford fleet, operates the fabrication shops and performs facility and fire systems maintenance. In 1999, these activities resulted in the recycling of nearly 112,400 pounds of materials from fleet maintenance, 35,000 pounds of machine coolant from metal fabrication and 8,600 pounds of propylene glycol from fire systems maintenance. ♦



SAFE TO TRAVEL: A staff member of the Benton-Franklin Health District checks Brittney Berry's seat to ensure that the seat and straps are adequate for her size and age. Brittney is the daughter of Pam Berry, Pacific Northwest National Laboratory. Parents and caregivers participated in a car seat safety check on April 14 at PNNL to determine whether their car seats were used correctly. Thirty-six car seats were inspected during the event, which was free and open to the public. Benton-Franklin Health District staff members and their volunteers also checked car seat brands and model numbers for manufacturer recalls. Team Battelle, the Working Parent Support Group, Supportive Work Environment Advisory Board, Women's Forum and Battelle Staff Association sponsored the event.

Regular Features



LETTERS

Employees are invited to write letters of general interest on work-related topics. Anonymous letters will not be printed. We reserve the right to edit letters or not to accept letters for publication. Send your letters to the *Reach*, B3-30, or to *Hanford Reach on e-mail. Letters are limited to 300 words, and must include your name, company, work group and location. Opinions expressed are those of the author and not of DOE-RL, ORP or their contractors.

Give credit to workers

Reading Michele Gerber's March 13 *Hanford Reach* article, "Spent Nuclear Fuel Project meets some formidable technical challenges," about the "outside" successes of the SNF Project brought to mind the following analogy.

I have two sisters with young children. My sisters and their spouses have the real duty of taking care of their kids, a full-time job. However, I stop in now and then, sometimes with presents, devoting my brief but fun play time with the kids and reaping the reward of always looking like the "good guy," while my sisters are responsible for the real duty of raising their kids.

Gerber's article read somewhat the same way — she heaped accolades on superman-like outside experts such as "...the prestigious scientific consulting firm of Fauske and Associates of Chicago" and continued on to mention the outside "expert" peer review by the Department of Energy Savannah River Site, scientists at the University of California at Berkeley and scientists from a French nuclear company. Unfortunately, the outside experts seem to get all the credit.

Not mentioned are the on-site people who contributed to the same technical problems and accompanying solutions, such as adequate water removal during the cold vacuum drying process — a great morale boost to the on-site mortals performing the "daily dirty diaper changes." At least Gerber could offer some cheese with my (our) wine.

Michael Packer
Fluor Hanford

Editors' note: The author of the article, Michele Gerber, says, "Good point Mike! The closure of technical issues discussed in the March 13 article was achieved through the hard work of individuals, many of whom are members of the on-site SNF Project team. However, Hanford's historical legacy of secrecy makes it imperative that, in the age of the cleanup, we obtain outside, independent checks and verifications of our work. It is heartening to note that the independent reviewers validated the conclusions of the on-site SNF Project technical team."

What's the password?

I applaud the current attempt to upgrade computer security on the HLAN system. Soon we will all have to use unintelligible concatenations of letters, numbers and special characters to access our system regardless of whether we are accessing classified information or not. This change will ensure that no one will be able to "crack" our passwords illegally.

I look forward to the day that ne'er-do-wells will have to open desk drawers for notes or hunt for post-its on monitors for those strange characters that no one will remember and thus will write down for safe-keeping. True security advancement! Here's an excellent password I'm thinking of: D?sfuncti*nal. I'd better hurry and write that down so I can put it in my desk drawer.

Stephen Garinger
CH2M HILL Hanford Group



CALENDAR

May events at the Hanford Technical Library

All of the following events will take place at the Consolidated Information Center, Washington State University Tri-Cities campus.

- **Library Tour** — May 4, 8:30 a.m. Take a tour of the library and find out what services are available to you in the library and on your desktop.
- **How to Find Information on the Internet** — May 11, 8:30 a.m. Learn how to tunnel through the mountains of information and discover Internet sites that are useful for your day-to-day work.
- **Using the Internet to Stay Current** — May 18, 8:30 a.m. Find out about the variety of resources and services the library offers to assist researchers in keeping up to date in their fields.

Can't make these times? The library staff members are also available for presentations at group meetings or brown-bag sessions. For more information, contact Mary Frances Lembo at 372-7441 or mf.lembo@pnl.gov. or visit the library's Web site at <http://htlweb.pnl.gov>. The Hanford Technical Library is a site service operated by the Pacific Northwest National Laboratory.

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Regular Features

AQP meets May 9 in Richland

Rico Yingling, director of operations for Da Vinci Gourmet, Seattle, will speak on "Using Baldrige as a Template for Performance Excellence and Business Results" at the May 9 dinner meeting of the local chapter of the Association for Quality and Participation (AQP). Yingling is past site manager for Borden Chemical in Kent, Wash. The meeting will be held at the Shilo Inn, with networking at 5 p.m., buffet dinner at 6 and the presentation at 7. The dinner costs \$16 for AQP members, \$19 for non-members or \$5 for the presentation only. Call 375-4773 or send an e-mail message to cburr@3-cities.com to make your reservation by May 4. For more information about the topic and the speaker, visit the chapter Web site at <http://www.3-cities.com/~gates/AQPQuest.htm>.

American Red Cross blood drive at HAMMER

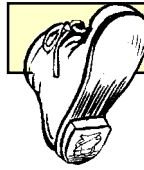
The American Red Cross will hold a blood drive on May 10 from 9 a.m. to 2:30 p.m. at the Volpentest HAMMER Training and Education Center in the Training Support Building Vehicle Bay. Contact Libby Sickler at 376-7117 for more information or to schedule an appointment.

Publisher will speak at NAPM meeting

Scott Fivash, president and publisher of *Washington CEO* magazine, will be the featured speaker at the National Association of Purchasing Management - Columbia Basin program on May 17 at Cavanaugh's at Columbia Center in Kennewick. The social hour starts at 5 p.m., dinner starts at 6 and Fivash will begin his presentation at 6:30. Attendance is open to interested members of the business community. Advanced reservations are required and the cost for dinner is \$14. Contact Lonnie O'Neal at 509-754-5035 to make a reservation. For more information about the program and NAPM-CB activities, visit the Web site at www.mltweb.com/napm/napmcb.htm.

N Reactor groups to hold reunion

The seventh annual reunion for UNC/100N/K/300 Area Fuels and N Reactor-associated groups will begin at 3:30 p.m. on May 19 at Jackson's in Richland. For more information, call Joyce LoParco at 373-2317 or 582-6994, Sherry Foreman at 943-5934 or Paul Vinther at 943-1747. ♦



SHOEMOBILE

100 K Area, parking lot south of MO-401

May 2 B.C. Sales 7 a.m. to 9 a.m.

May 19 Iron Age 7:30 a.m. to 9 a.m.

200 East Area, northeast gravel parking lot of 2101-M

May 2 B.C. Sales 10 a.m. to 11:30 a.m.

May 3 Sound Safety Products 7 a.m. to 12 noon

May 19 Iron Age 9:30 a.m. to 11:30 a.m.

200 West Area, parking lot east of MO-281

May 2 B.C. Sales 12 noon to 2 p.m.

May 3 Sound Safety Products 1 p.m. to 4 p.m.

May 19 Iron Age 12 noon to 2 a.m.

300 Area, along fence east of Wisconsin

May 2 B.C. Sales 2 p.m. to 5 p.m.

May 2 Sound Safety Products 12:30 p.m. to 4 p.m.

Oops

Mailstop identification number correction

The mailstop identification number for Plant Mail to pick up your excess, used plant mail envelopes published in the article, "Have Plant Mail pick up your unused envelopes," *Hanford Reach*, April 24, was incorrect. The correct mailstop identification number is G3-00.

CH2M HILL Hanford Group also a sponsor

CH2M HILL Hanford Group is also a sponsor of the conference "Linking Regional Resources-Advancing the Northwest Economy through Science and Technology." This conference was described in the article, "PNNL and INEEL sponsor northwest states' economic conference" (*Hanford Reach*, April 24).

Check Web site for badging office hours

The hours for the temporary badging office reported in "Rebadging of all Hanford Site employees has begun in earnest," *Hanford Reach*, April 24, have changed. Visit the Web site at http://www.rl.gov/sas/pg3_psec/pg37/pg37newbadge.htm for the hours of the temporary badging office. ♦

Regular Features

CLASSES



DOE NEPA Process Training offered

Department of Energy National Environmental Policy Act Process Training (DOE course No. ESH112, contractor course No. 170130) will be offered May 10-11 from 7:30 a.m. to 4 p.m. at the Hanford Training Center (on Terminal Drive by the Richland Airport). The cost is \$775. The training is designed to address Hanford-specific DOE NEPA policy, planning and documentation requirements. The participant will discuss NEPA as an environmental planning tool and how it applies to project and baseline planning. Specific applications of environmental impact statements, supplement analysis, environmental assessments, categorical exclusions and site-wide categorical exclusions will be covered. Call Kim Welsch of Fluor Hanford Environmental Services at 376-4373 for more information.

Columbia Basin College Small Business Development Center offers:

- **Small Business Accounting Basics** – May 2, 3 and 4, 6-9 p.m. Cost: \$35. Instructor: Don Smith, CPA. The class will be held at the Energy Northwest Multipurpose Facility.
- **Small Business Tax Accounting** – May 9 or June 7, 6-10 p.m. Cost: \$35. Instructor: Don Smith, CPA. The class will be held at the Energy Northwest Multipurpose Facility.
- **Small Business Commercial Site Selection** – May 16 and 17, 6-9 p.m. Cost: \$35. Instructor: Gayle Moore-Stack, CCIM, CPMR. The class will be held at the Energy Northwest Multipurpose Facility.
- **Small Business Financial Management** – May 23, 24 and 25, 6-9 p.m. Cost: \$35. Instructor: Glynn Lamberson. The class will be held at the Energy Northwest Multipurpose Facility.
- **Small Business Advertising Basics** – May 20 or June 3, 9 a.m.-12 p.m. Cost: \$15. Instructor: Blake Escudier. The class will be held at the TRIDEC Conference Center.

The TRIDEC Conference Center is located at 901 N. Colorado, Kennewick. The Energy Northwest Multipurpose Facility is located at 3000 George Washington Way, Richland. To register or obtain more information, call Ritzy Rafer at 735-6222.

Master's programs at WSU described in meetings tonight and May 3

Washington State University Tri-Cities Business Department and the WSU Yakima Learning Center will be hosting information sessions in May to describe the WSU master's of business administration program.

At the information session Dr. David Lemak, MBA program coordinator, will explain the MBA program, the requirements for admission, and the benefits this program has for residents of the Tri-Cities, Yakima and surrounding areas.

Information on the master's of technology management, the first graduate degree in the Pacific Northwest specifically designed to educate corporate managers to become leaders in technology management, will also be presented at the meeting in the Tri-Cities. This meeting will be held May 1 from 6 to 7 p.m. at Cavanaugh's, 1101 N. Columbia Center Blvd. in Kennewick. Contact Wanda Walters at 372-7360 for more information.

The meeting in Yakima will be held May 3 from 6 to 7 p.m. at the Yakima County Courthouse, 128 N. 2nd St., Room 232. Contact Rena Kohler at 509-574-1600 for more information. ♦

SECURITY Pays in Many Ways

Get INVOLVED!

**Know someone who's
improving site security?**

Nominate him or her through the
"Security Pays In Many Ways" awareness campaign.
More info at [Http://www.RI.Gov/sas/pg1v3.Htm](http://www.RI.Gov/sas/pg1v3.Htm),
or call 376-1820.

Regular Features

B R A V O



Nielsen named FFTF employee of the quarter



Nielsen

Fluor Hanford chemical engineer Debbie Nielsen has been named the Fast Flux Test Facility employee of the quarter.

Nielsen acted as the lead for the FFTF Programmatic Environmental Impact Statement Data Call and developed an outstanding product for input into the PEIS. The quality of this input will directly affect the quality of the PEIS document as a whole, which will ultimately help in getting a positive decision for restart. Her excellent technical and environmental background as well as her writing skills and issue sensitivity resulted in a superior product for the Department of Energy customers.

Nielsen acted as the lead author for the FFTF Waste Minimization and Management Plan and again showed her commitment to excellence in the production of the document.

Nielsen also was instrumental in providing input to public forums and addressing public forums in support of an FFTF restart. She developed strategies for restart planning efforts and was the lead author of the technical information document for restart.



Polus

Polus earns spot award for FEHIC training

Paul Polus, a River Corridor Project trainer for Fluor Hanford, has received a spot award for his leadership in the development of the Facility Emergency Hazards and Information Checklist (FEHIC) training. FEHIC training communicates the facility hazards to the employees and results in a more informed workforce, thus improving worker safety. The Web-based FEHIC saves dollars, promotes consistency of delivery and has been shared with other projects for implementation.



Marcus

Marcus wins ASTM service award

The American Society for Testing and Materials recently presented Mark Marcus, manager of Hanford Analytical Services Programs, an award for his service on the standing committee on publications. This committee serves as an advisory group and as the senior editorial board for the ASTM. The award presentation took place in Fort Lauderdale, Fla.

In the past seven years on this committee, Marcus has served as senior editor of more than 20 standard technical publications, which are the proceedings of the technical symposia sponsored by ASTM. The topics of these standard technical publications range from environmental sampling to skiing trauma and safety. ♦

Regular Features

NEWSBRIEFS



Bacon and Delquadri approved to receive PTB transfers

Ron Bacon, a Fluor Hanford employee assigned to the Waste Encapsulation and Storage Facility, and Dennis Delquadri, a Fluor Hanford employee assigned to the Spent Nuclear Fuel Project, have been approved to receive transfers of Personal Time Bank hours.

Bacon's son, Ron Jr., has been diagnosed with a brain tumor. Bacon will need time off for the surgery, recovery and treatments to assist his son. Delquadri's wife, Sandy, is recovering from recent cancer surgery and is faced with more chemotherapy and radiation treatments, rehabilitation and, potentially, more surgery. Delquadri will need time off to assist her.

Any PHMC employee who would like to transfer some PTB time to either Bacon or Delquadri can complete a Vacation Transfer Request form (A-6002-807) on Site Forms. For PTB transfers to Bacon, send the form to Lindsay Nelsen, Fluor Hanford Industrial Relations, at B2-64. For PTB transfers to Delquadri, send the form to Mike Dickinson, Spent Nuclear Fuel Industrial Relations, at B2-64. Any time should be transferred in one-hour increments.

PTB transfer request approved for CHG pair

CH2M HILL Hanford Group employees Charlene DeBoise and Delora Tinsley have been approved to receive transfers of Personal Time Bank hours.

DeBoise's husband, William, has been diagnosed with cancer, and she will need time away from work to assist with his care during the next two months. Tinsley's mother is having orthopedic surgery in Seattle. Her recovery time is expected to be a few weeks.

Any CHG employee who would like to transfer some of his or her vacation time to DeBoise or Tinsley should complete a PTB/Vacation Transfer Request form (A-6002-807). For PTB transfers to De Boise, send the form to Vicki Locati, Industrial Relations, at R2-57. For PTB transfers to Tinsley, send the form to Andi Bischoff, CH2M HILL Human Resources, at R2-57. Any time should be transferred in one-hour increments. ♦

VANPOOLS



Vanpool ads are run for two weeks. Ads must be resubmitted to run in subsequent issues of the *Hanford Reach*. The deadline for submissions is Thursday, 10 days prior to publication.

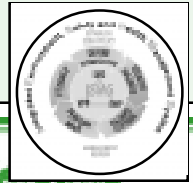
Protection Technology Hanford reminds employees to wear their badges. Vanpool and carpool drivers are responsible for ensuring riders are badged. If a passenger forgets his or her badge, Patrol must be informed at the barricades. For more information, look on the Hanford Web in the Projects and Activities section, Safeguards and Security (PHMC) at <http://www.rl.gov:1050/sas/pg1v3htm>.

RICHLAND

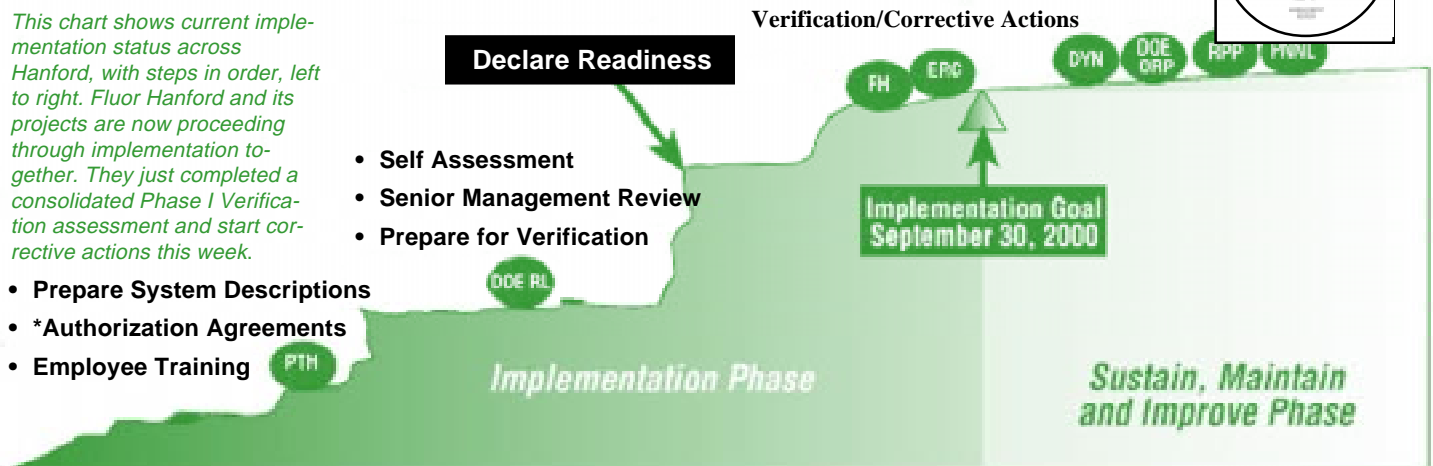
Save your car for summer trips. Drivers and riders are welcome on vanpool from Richland to 200W. We care about you. Picks up at Wright, McMurray and Bethel Church on Jadwin. Stops at PFP, MO-287, 277-W, MO-279, MO-281 and 272-WA. Call **Bobbie** at 373-2119 or **John** at 372-1041. 5/1

Vanpool originates at Albertson's on Gage (near Meadow Springs) goes through Hills West, stops at Bookwalter's Park 'n Ride, travels to 200E, stops at 2750-E and surrounding buildings, then MO-286 area and 2074-HV. Standard 8x9 schedule. Call **Brenda** at 373-9370. 4/24 ♦

Integrated Environment, Safety and Health Management System



This chart shows current implementation status across Hanford, with steps in order, left to right. Fluor Hanford and its projects are now proceeding through implementation together. They just completed a consolidated Phase I Verification assessment and start corrective actions this week.



* ONLY THOSE WITH CATEGORY VII NUCLEAR FACILITIES

Those implementing ISMS at Hanford are:

DOE ORP - Department of Energy
Office of River Protection

DOE RL - Department of Energy
Richland Operations Office

DYN - DynCorp Tri-Cities Services, Inc.

ERC - Environmental Restoration
Contractor team (Bechtel Hanford, Inc.
and subcontractors)

FH - Fluor Hanford and its projects

PNNL - Pacific Northwest National
Laboratory

PTH - Protection Technology Hanford

RPP - River Protection Project
(CH2M HILL for ORP)

DOE spells out complex-wide ISMS criteria

Seven Integrated Safety Management (ISM) criteria have been developed and distributed across the Department of Energy complex to assist DOE sites in achieving their common goal of implementing ISM by Sept. 30.

In a letter to field offices, Deputy Secretary of Energy T. J. Glauthier, who visited Hanford last month, provided the criteria to guide field managers as they review and report on implementation progress.

The criteria were developed by the Safety Management Implementation Team, known as SMIT, which includes representatives from throughout the department. These criteria build on the ISM Phase I and Phase II Verification processes, focus on DOE's actions and implementation, and provide for an integrated roll-up of ISM implementation activities throughout DOE.

These are the seven guiding criteria:

1. DOE and contractor organizations have established and are maintaining agreed-upon sets of applicable requirements and standards.
2. DOE has approved applicable Safety Management System descriptions.
3. DOE has verified adequate implementation of applicable Safety Management Systems.
4. DOE functions, responsibilities and authorities (FRA) documents are implemented.
5. DOE has verified that feedback and improvement programs are in place and effective.
6. DOE line oversight programs are in place and effective.
7. DOE has established a documented process to maintain applicable Safety Management Systems. ♦

Challenge for ISMS: Focus on sustaining, maintaining effectiveness

Jim Schildknecht, FH

Since day one, my philosophy on implementation of the Integrated Environment, Safety and Health Management System (ISMS) has been, "We can do this."

In fact, it can be said that we already do our work safely here at Hanford. Our focus now is on continuous improvement, and on developing strategies for maintaining and sustaining an effective ISMS.

People who work in our facilities have been improving work-control processes, tools and behaviors for quite some time. Some work processes and tools that are enhanced by or developed through ISMS include Automated Job Hazard Analysis (AJHA), pre-job briefings, post-job reviews and the Employee Job Task Analysis (EJTA). I have found that managers generally support work-control process improvements as good business strategy.

ISMS is also complemented by successful safety initiatives already in place such as Enhanced Work Planning (EWP), the Voluntary Protection Program (VPP), the Environmental Management System (EMS) and Responsible Care for chemical management.

At the activity level, we must keep the ball rolling for worker involve-

ment in work planning — specifically in hazard identification and analysis. I've learned from visiting other sites in the DOE complex that Hanford managers and our bargaining-unit safety representatives have truly set the standard for "real worker involvement."

On the other hand, we can keep getting better. We must remember that it is the skilled construction, maintenance and operations worker who has the most to lose if complex and moderate- to high-risk work activities are not well planned or executed. We need their input way up front in the process.

DOE, Fluor Hanford and the other contractors are proceeding

through the ISMS implementation and verifications. Our efforts to sustain ISMS will focus first on continuing with implementation. Before we get there, some complex work has to be finalized.

I believe the ISMS project folks who have had the toughest assignments are those who have been tasked with describing their systems by linking mechanisms to the ISMS Core Functions and Guiding Principles, and closing gaps identified in management assessments.

Thank your project-level ISMS coordinators for doing this work very well. ♦



Jim Schildknecht is the Fluor Hanford ISMS Project activity-level implementation coordinator. He has worked at Hanford for more than 20 years in construction engineering, technical procedures, maintenance management programs and conduct of operations.



THE BOOK ON ISMS: Pam Doran and Jessica Dement assemble documentation for the April 17-28 Phase I Verification of FH and its projects.

ISMS guides Fluor Hanford forklift operator training

Deborah Dunn, FH

Fluor Hanford forklift operators are demonstrating Integrated Environment, Safety and Health Management System principles as they tackle an operator training and qualification course.

“This kind of activity shows ISMS core functions,” said Richard Ortiz, the course evaluator. “We define the scope of work, identify the hazards and requirements, perform the work within controls and have feedback and improvement. It also shows how ISMS works hand-in-hand with the Voluntary Protection Program. VPP covers work-site analysis, hazard prevention and control, and safety and health training.”

The training also supports the guiding principles of ISMS — “worker involvement” and “competence commensurate with responsibilities.”

The course, Occupational Safety and Health Act (OSHA) Forklift Training, has just been completed by the Fluor Hanford forklift operators who support DynCorp Tri-cities Services Transportation Operations, led by Tom Savage.

Ortiz and Pat Sarver teach and evaluate the course south of the Wye Barricade. Their counterparts to the north are Ron Mashburn and Joe Aldridge. They and the forklift operators are members of the Hanford Atomic Metal Trades Council. According to Jill Molnaa, HAMTC representative to the Fluor Hanford ISMS Implementation Team, the training is an example of HAMTC and the companies working together for a safe work environment.



Lanny Hindman of HAMTC and Fluor Hanford takes his forklift driving test as part of the OSHA forklift training.

Hindman needs the training to stay current in his job supporting DynCorp Tri-Cities Special and Stores Delivery Service.

Teamwork is key

A team approach in conducting the course allows one certified instructor/evaluator to teach while the other tests. This, in turn, enables efficient use of operator time because training and testing occur on the same day. When one person both instructs and evaluates, each function must take place on a different day.





Each of seven forklift classifications has its own qualification process. Classifications coincide with the types of forklifts: electric, propane- or gasoline-powered, stand-up, sit-down, walk-behind and all-terrain. Operators must qualify for each class of forklift they operate. Some use forklifts from all seven classifications and must take seven different courses to maintain current qualifications.

Forklift operators, Ortiz said, have to maintain alertness to their surroundings. The training enforces this outlook along with safety-based routines like equipment checks.

“You have to make sure everything is running safely and smoothly, and avoid accidents,” Ortiz said. “You and others have to be aware of what the forklift is doing. I’ve been working at Hanford for 25 years and we have a new way of working — ISMS. It will work if we all pull together.” ♦

Fluor Hanford ISMS project managers share perspectives

Four project managers have led Fluor Hanford's Integrated Environment, Safety and Health Management System (ISMS) implementation. Starting in 1997, Lou Simmons put a system in place and spread the word. Gerry Griffin applied project discipline to manage the complexity. Dick Mitchell coordinated a myriad of verification details. Mark Peres is finalizing implementation as the site moves toward the next phase — sustain, maintain and improve what has been established.

Managers	 Lou Simmons	 Gerry Griffin	 Dick Mitchell	 Mark Peres
	Oct. 1997 - Mar. 1999	April - Aug. 1999	Sept. - Dec. 1999	Jan. - Oct. 2000
Priorities	Put system in place; spread the word.	Apply project discipline; lead to Declaration of Readiness.	Steer Fluor Daniel Hanford through Phase I Verification.	Achieve full implementation on an accelerated schedule.
What	Lou Simmons was a member of the cross-site team assigned the first ISM task in 1997—writing an ISMS plan for the companies of the Project Hanford Management Contract. Next, he became manager of the effort to implement the plan.	Gerry Griffin's assignment was to develop an implementation schedule using project management techniques, and to lead activities to the point of Declaration of Readiness which triggers DOE's verification assessment.	Dick Mitchell spearheaded employee and manager ISMS training; coordinated the company's in-briefing presentations for the 25 assessors, and developed and oversaw logistics for the assessors' two-week visit.	Mark Peres, his management and team, are accelerating the schedule to beat the national implementation deadline on Sept. 30. A single system description and consolidated verifications of several projects at once are keys to acceleration.
Quotes	"I encourage facility managers, staff and bargaining-unit people to stay engaged. ... Our continued diligence will result in improved working conditions for everyone."	"I would like to point out to people that ISMS is the first safety initiative that's focused on the work — how we can get the work done safely."	"I think Fluor prepared as well as any company across the DOE complex. I thought our verification preparation team of about 30 people did an outstanding job."	"I look at it as a construction project. I'm the guy doing the building. When it's done, I'm gone and it's turned over to someone else who will own it and maintain it."
Achievement	"Getting the plan written and approved was a big accomplishment and a real team effort between FDH and RL."	"The Automated Job Hazard Analysis tool is ... an outstanding contribution to safety. It facilitates worker involvement."	"At the company level, we did a very good job of implementing ISMS."	"You can use different project management techniques to accelerate a schedule. ... We hope to complete as early as July."
What Now?	Coordinating implementation for the River Corridor Project.	Fluor Hanford director of Emergency Preparedness.	Kaiser-Hill infrastructure project manager at home in Colorado.	Completing implementation activities.